Exhibit 4

NOTICE OF DISCIPLINARY ACTION

CME-13-9575-BC-2 **Effective Date** 14 December 2017

FILE NO.:

CME 13-9575-BC

NON-MEMBER:

Brandon Elsasser

CME RULE VIOLATION:

Rule 534 ("Wash Trades Prohibited)

No person shall place or accept buy and sell orders in the same product and expiration month, and, for a put or call option, the same strike price, where the person knows or reasonably should know that the purpose of the orders is to avoid taking a bona fide market position exposed to market risk (transactions commonly known or referred to as wash sales). Buy and sell orders for different accounts with common beneficial ownership that are entered with the intent to negate market risk or price competition shall also be deemed to violate the prohibition on wash trades. Additionally, no person shall knowingly execute or accommodate the execution of such orders by direct or indirect means.

FINDINGS:

Pursuant to an offer of settlement in which Brandon Elsasser neither admitted nor denied the rule violations upon which the penalty is based, on December 12, 2017, a Panel of the Chicago Mercantile Exchange Business Conduct Committee ("Panel") found that in 2014 and 2015, Elsasser entered numerous matching buy and sell orders for Eurodollar futures trades on the Globex trading platform for an account with common beneficial ownership. During the period from June 2014 through July 2015, Elsasser repeatedly entered opposing buy and sell orders for the same account with knowledge that the orders would match. This non-bona fide trading activity allowed his employer—a participant in the CME Interest Rate Market Maker Program for Eurodollar Pack and Bundle Futures ("Program")—to unjustifiably earn monthly trading-fee credits under the Program based on the number of Eurodollar futures contracts they traded.

The Panel concluded that this activity violated CME Rule 534.

PENALTY:

In accordance with the settlement offer, the Panel ordered Elsasser to pay a fine of \$40,000, and to serve a suspension of 20 business days from accessing any CME Group Inc. trading floor and direct and indirect access to all electronic trading and clearing platforms owned or controlled by CME Group Inc., including CME Globex.

EFFECTIVE DATE:

December 14, 2017